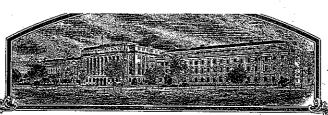
No.



200200079

THE UNITED STAMES OF AMERICA

TO ALL TO WHOM THESE: PRESENTS; SHAML COME;

Pioneer Hi-Bred International, Inc.

THE COME, THERE HAS BEEN PRESENTED TO THE

Secretary of Agriculture

AN APPLICATION REQUESTING A CERTIFICATE OF PROTECTION FOR AN ALLEGED DISTINCT VARIETY OF SEXUALLY REPRODUCED, OR TUBER PROPAGATED PLANT, THE NAME AND DESCRIPTION OF WHICH ARE CONTAINED IN THE APPLICATION AND EXHIBITS, A COPY OF WHICH IS HEREUNTO ANNEXED AND MADE A PART HEREOF, AND THE VARIOUS REQUIREMENTS OF LAW IN SUCH CASES MADE AND PROVIDED HAVE BEEN COMPLIED WITH, AND THE TILE THERETO IS, FROM THE RECORDS OF THE PLANT. VARIETY PROTECTION OFFICE, IN THE APPLICANT(S) INDICATED IN THE SAID COPY, AND WHEREAS, UPON DUE EXAMINATION MADE, THE SAID APPLICANT(S) IS (ARE) ADJUDGED TO BE ENTITLED TO A CERTIFICATE OF PLANT VARIETY PROTECTION UNDER THE LAW.

NOW THEREFORE, THIS CERTIFICATE OF PLANT VARIETY PROTECTION IS TO GRANT UNTO THE SAID APPLICANT(S) AND THE SUCCESSORS, HEIRS OR ASSIGNS OF THE SAID APPLICANT(S) FOR THE TERM OF TWENTY YEARS FROM THE DATE OF THIS GRANT, SUBJECT TO THE PAYMENT OF THE REQUIRED FEES AND PERIODIC REPLENISHMENT OF VIABLE BASIC SEED OF THE VARIETY IN A PUBLIC REPOSITIORY AS PROVIDED BY LAW, THE RIGHT TO EXCLUDE OTHERS FROM SELLING THE VARIETY, OR OFFERING IT FOR SALE, OR REPRODUCING IT, OR IMPORTING IT, OR EXPORTING IT, CONDITIONING IT FOR PROPAGATION, OR STOCKING IT FOR ANY OF THE ABOVE PURPOSE, OR USING IT IN SCING A HYBRID OR DIFFERENT VARIETY THEREFROM, TO THE EXTENT PROVIDED BY THE PLANT VARIETY TETON ACT. (84 STAT. 1542, AS AMENDED, 7 U.S.C. 2321 ET SEQ.)

SOYBEAN

'91B42'

In Jestimonn Therest, I have hereunto set my hand and caused the seal of the Plant Inriety Protection Office to be affixed at the City of Washington, D.C. this second day of May, in the year two thousand two.

Au i

Demoke

Commissioner Plant Variety Protection Office Apricultural Marketina Service Spiculture Spiculture U.S. DEPARTMENT OF AGRICULTURE
AGRICULTURAL MARKETING SERVICE
SCIENCE AND TECHNOLOGY - PLANT VARIETY PROTECTION OFFICE

The following statements are made in accordance with the Privacy Act of 1974 (5 U.S.C. 552a) and the Paperwork Reduction Act (PRA) of 1995.

Application is required in order to determine if a plant variety protection certificate is to be issued (7 U.S.C. 2421). Information is held confidential until certificate is issued (7 U.S.C. 2426).

APPLICATION FOR PLANT VARIETY PROTECTION CERTIFICATE (Instructions and information collection burden statement on reverse)

NAME OF OWNER Pioneer Hi-Bred Inter	national, Inc				2. TEMPORARY DESIGNAT EXPERIMENTAL NAME	ON OR	3. VARIETY NAME 91B42
4. ADDRESS (Street and No., or R.F.D. No. 7300 N. W. 62 nd Avenue P.O. Box 1004 Johnston, IA 50131	, City, State, and ZIP Code, and C	Country)			5. TELEPHONE (include 515-254-2638	area code)	FOR OFFICIAL USE ONLY
					6. FAX (include area code 515-253-2478	e)	FILING DATE
IF THE OWNER NAMED IS NOT A "PERS ORGANIZATION (corporation, partnership Corporate	SON", GIVE FORM OF , association, etc.)	8. IF INC STAT	CORPORA E OF INCC	TED, GIVE DRPORATION	9. DATE OF INCORPORATION Nay 6, 1926	ON	01/22/2002
10. NAME AND ADDRESS OF OWNER R Daria Schmidt, Ph. D. 7300 N.W. 62 rd Avenue P.O. Box 1004 Johnston ,IA 50131-1004	EPRESENTATIVE(S) TO SERVE Steve Callestine, Exq 7100 N.W 62 rd Avenue P.O Box 1000 Johnston, IA 50131-1000	IN THIS APPLI	CATION. (F	First person listed will	receive all papers)	20 20 20 20 20 20 20 20 20 20 20 20 20 2	FILING AND EXAMINATION FEES: \$ 0//22/2002 R C DATE 2 2705.00 CERTIFICATION FEE: \$ 320 DATE 3/5/02
11. TELEPHONE (Include area code) 515-254-2638	12. FAX (Include area code) 515-253-2478)		MAIL imidt@pioneer.com		14. CROI Soybean	KIND (Common Name)
verification that tissue culture w repository)	ng History of the Variety nctness ion of Variety Ition of the Variety (Optional) sasis of the Owner's Ownership e untreated seeds or, for tuber pri ill be depositied and maintained in \$2,705), made payable to "Treasu y Protection Office) INVESTED MATERIAL) OR A HY OSED OF, TRANSFERRED, OR X NO E OF FIRST SALE, DISPOSITION MSTANCES. (Please use space If basic seed of the variety will be ure will be deposited in a public in er of this sexually reproduced or t isions of Section 42 of the Plant V	opagated varieti n an approved pl urer of the United BRID PRODUC USED IN THE I IN TRANSFER, I Indicated on rev furnished with a repository and n uber propagate Variety Protection	ies, ublic d EED U. S. OR OR USE erse.) application and intained of diplant varian Act.	20. DOES THE OF VARIETY BE IF YES, WHICE 21. DOES THE OF LIMITED AS THE OF LIMITED AS THE OF LIMITED AS THE OF LIMITED AS THE VARIETY RESULTS OF LIMITED AS THE VARIETY RESULTS OF LIMITED AS THE VARIETY REFERENCE TO THE duration of the duration of the left, and believe(s) the limited as the	SEED? See Section 83(a) of 6 (if "yes", answer items 20 and 21 below) WNER SPECIFY THAT SEED CLIMITED AS TO NUMBER OF CHATTHE CLOONUMBER OF GENERATION WNER SPECIFY THAT THE CLOONUMBER OF GENERATION CIFY THE FOUNDAT EXPLANTAGE OF FILING CONUMBER. (Please use space in page 1) and page 2) and page 2) and page 3.	OF THIS CLASSES? ATION R ASSES BE IS? ION Use the space THE VARIET GHT OR PATE ATION ATION OR ISSUANCE Indicated on ret with such regu	NO (If "no," go to item 22) YES NO EGISTERED CERTIFIED YES NO REGISTERED CERTIFIED indicated on the reverse.) Y PROTECTED BY INTELLECTUAL NT)? NO AND ASSIGNED rerse.)
SIGNATURE OF OWNER TOUGH. SOM	. / 1	otection and fes	out in pena	SIGNATURE OF C	OWNER		
NAME (Please print or type) Daria H. Schmidt	·			NAME (Please prin	it or type)		
CAPACITY OR TITLE Director, Technology Integration and Association	DATE 12-	31-01		CAPACITY OR TIT	LE .		DATE

INSTRUCTIONS

GENERAL: To be effectively filed with the Plant Variety Protection Office (PVPO), ALL of the following items must be received in the PVPO: (1) Completed application form signed by the owner; (2) completed exhibits A, B, C, E; (3) for a seed reproduced variety at least 2,500 viable untreated seeds, for a hybrid variety at least 2,500 untreated seeds of each line necessary to reproduce the variety, or for tuber reproduced varieties verification that a viable (in the sense that it will reproduce an entire plant) tissue culture will be deposited and maintained in an approved public repository; (4) check drawn on a U.S. bank for \$2,705 (\$320 filing fee and \$2,385 examination fee), payable to "Treasurer of the United States" (See Section 97.6 of the Regulations and Rules of Practice.) Partial applications will be held in the PVPO for not more than 90 days, then returned to the applicant as unfiled. Mail application and other requirements to Plant Variety Protection Office, AMS, USDA, Room 500, NAL Building, 10301 Baltimore Avenue, Beltsville, MD 20705-2351. Retain one copy for your files. All items on the face of the application are self explanatory unless noted below. Corrections on the application form and exhibits must be initialed and dated. DO NOT use masking materials to make corrections. If a certificate is allowed, you will be requested to send a check payable to "Treasurer of the United States" in the amount of \$320 for issuance of the certificate. Certificates will be issued to owner, not licensee or agent.

Plant Variety Protection Office Telephone: (301) 504-5518 FAX: (301) 504-5291 200200079

ITEM

18a. Give:

Homepage: http://www.ams.usda.gov/science/pvpo/pvp.htm

- (1) the genealogy, including public and commercial varieties, lines, or clones used, and the breeding method;(2) the details of subsequent stages of selection and multiplication;
- (3) evidence of uniformity and stability; and
- (4) the type and frequency of variants during reproduction and multiplication and state how these variants may be identified
- 18b. Give a summary of the variety's distinctness. Clearly state how this application variety may be distinguished from all other varieties in the same crop. If the new variety is most similar to one variety or a group of related varieties:
 - (1) identify these varieties and state all differences objectively;
 - (2) attach statistical data for characters expressed numerically and demonstrate that these are clear differences; and
 - (3) submit, if helpful, seed and plant specimens or photographs (prints) of seed and plant comparisons which clearly indicate distinctness.
- 18c. Exhibit C forms are available from the PVPO Office for most crops; specify crop kind. Fill in Exhibit C (Objective Description of Variety) form as completely as possible to describe your variety.
- 18d. Optional additional characteristics and/or photographs. Describe any additional characteristics that cannot be accurately conveyed in Exhibit C. Use comparative varieties as is necessary to reveal more accurately the characteristics that are difficult to describe, such as plant habit, plant color, disease resistance, etc.
- 18e. Section 52(5) of the Act requires applicants to furnish a statement of the basis of the applicant's ownership. An Exhibit E form is available from the PVPO.
- 19. If "Yes" is specified (seed of this variety be sold by variety name only, as a class of certified seed), the applicant MAY NOT reverse this affirmative decision after the variety has been sold and so labeled, the decision published, or the certificate issued. However, if "No" has been specified, the applicant may change the choice. (See Regulations and Rules of Practice, Section 97.103).
- 21. See Section 83 of the Act for the Contents and Term of Plant Variety Protection.
- 22. See Sections 41, 42, and 43 of the Act and Section 97.5 of the regulations for eligibility requirements.
- 23. See Section 5.5 of the Act for instructions on claiming the benefit of an earlier filing date.
- 21. CONTINUED FROM FRONT (Please provide a statement as to the limitation and sequence of generations that may be certified.)
- 22. CONTINUED FROM FRONT (Please provide the date of first sale, disposition, transfer, or use for each country and the circumstances, if the variety (including any harvested material) or a hybrid produced from this variety has been sold, disposed of, transferred, or used in the U.S. or other countries.)
- 23. CONTINUED FROM FRONT (Please give the country, date of filing or issuance, and assigned reference number, if the variety or any component of the variety is protected by intellectual property right (Plant Breeder's Right or Patent).)

NOTES: It is the responsibility of the applicant/owner to keep the PVPO informed of any changes of address or change of ownership or assignment or owner's representative during the life of the application/certificate. There is no charge for filing a change of address. The fee for filing a change of ownership or assignment or any modification of owner's name is specified in Section 97.175 of the regulations. (See Section 101 of the Act, and Sections 97.130, 97.131, 97.175(h) of the Regulations and Rules of Practice.)

To avoid conflict with other variety names in use, the applicant must check the variety names proposed by contacting: Seed Branch, AMS, USDA, Room 213, Building 306, Beltsville Agricultural Research Center--East, Beltsville, MD 20705. Telephone: (301) 504-8089.

According to the Paperwork Reduction Act of 1995, an agency may not conduct or sponsor, and a person is not required to respond to a collection of information unless it displays a valid OMB control number. The valid OMB control number for this collection of information is (0581-0055). The time required to complete this information collection is estimated to average 1.4 hours per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information.

The U.S. Department of Agriculture (USDA) prohibits discrimination in all its programs and activities on the basis of race, color, national origin, gender, religion, age, disability, political beliefs, sexual orientation, and marital or family status. (Not all prohibited bases apply to all programs.) Persons with disabilities who require alternative means for communication of program information (Braille, large print, audiotape, etc.) should contact the USDA's TARGET Center at 202-720-2600 (voice and TDD). To file a complaint of discrimination, write USDA, Director, Office of Civil Rights, Room 326-W, Whitten Building, 14th and Independence Avenue, SW, Washington, DC 20250-9410 or call (202) 720-5964 (voice and TDD). USDA is an equal opportunity provider and employer.

ST-470 (04-01) designed by the Piant Variety Protection Office with WordPorfect 6.0a. Replaces ST-470 (02-09) which is obsolete.

200200079

Exhibit A. Origin and Breeding History of the Variety

Soybean Variety 91B42

Variety 91B42 evolved from a cross made in the 1994 summer crossing block in Minnesota with the following parentage:

Parentage: 9182/YB23E

YB23E = Archer/9273

Variety 91B42 is an F4-derived line which was advanced to the F4 generation by modified single-seed descent. The F5 progeny row of 91B42 was grown in a plant row yield trial in the summer of 1996. Subsequently, 91B42 has undergone five years of extensive testing and purification and has been observed by the breeder to be uniform and stable for all plant traits from generation to generation, with no evidence of variants. On the basis of yield, Phytophthora resistance, Soybean Cyst Nematode resistance and iron chlorosis deficiency resistance, variety 91B42 was assigned a commercial number.

The purification block was grown during summer of 1999 in Minnesota and 60 sublines were harvested. Thirty four (34) sublines were planted in Chile for increase during the winter of 1999/2000. Six (6) of the 34 sublines were harvested. The six subline families were planted in an increase block (about 1.3 acres) during the summer of 2000 in Minnesota. The six subline families were harvested and bulked (breeders seed). Thirty-five (35) acres of parent seedstock (foundation seed equivalent) were grown in the summer of 2001.

Exhibit B. Statement of Distinctness

Soybean Variety 91B42

Variety 91B42 is most similar to variety 9151. Both varieties have purple flowers, tawny pubescence, yellow seeds with black hila, and resistance to *Phytophthora megasperma* as governed by the Rps1k gene. However, 91B42 is resistant to race 25 of *Phytophthora megasperma* and is resistant to race 3 of Soybean Cyst Nematode, whereas 9151 is susceptible to race 25 of *Phytophthora megasperma* and is susceptible to Race 3 of Soybean Cyst Nematode.

Variety 91B42 is also similar to variety 91B33. Both varieties have purple flowers, tawny pubescence, and resistance to *Phytophthora megasperma* as governed by the Rps1k gene. However, 91B42 has yellow seed with black hila, is resistant to race 25 of *Phytophthora megasperma*, and is resistant to race 3 of Soybean Cyst Nematode whereas 91B33 has yellow seed with brown hila, is susceptible to race 25 of *Phytophthora megasperma*, and susceptible to Race 3 of Soybean Cyst Nematode. In addition, 91B42 is susceptible to Roundup branded herbicides whereas 91B33 is resistant to Roundup brand herbicides.

Variety 91B42 is also similar to variety A1553 from Asgrow (Monsanto). Both varieties have purple flowers, tawny pubescence, yellow seed with black hila, and resistance to *Phytophthora megasperma* as governed by the Rps1k gene. However, 91B42 is resistant to race 25 of *Phytophthora megasperma* and resistant to race 3 of Soybean Cyst Nematode, whereas A1553 is susceptible to race 25 of *Phytophthora megasperma* and susceptible to Race 3 of Soybean Cyst Nematode.

According to the Paperwork Reduction Act of 1995, an agency may not conduct or sponsor, and a person is not required to respond to a collection of information unless it displays a valid OMB control number. The valid OMB control number for this collection of information is (0581-0055). The time required to complete this information collection is estimated to average 30 minutes per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information.

The U.S. Department of Agriculture (USDA) prohibits discrimination in all its programs and activities on the basis of race, color, national origin, gender, religion, age, disability, political beliefs, sexual orientation, and marital or family status. (Not all prohibited bases apply to all programs.) Persons with disabilities who require alternative means for communication of program information (Braille , large print, audiotape, etc.) should contact the USDA's TARGET Center at 202-720-2600 (voice and TDD).

To file a complaint of discrimination, write USDA, Director, Office of Civil Rights, Room 326-W, Whitten Building, 14th and Independence Avenue, SW, Washington, DC 20250-9410 or call (202) 720-5964 (voice and TDD). USDA is an equal opportunity provider and employer.

U.S. DEPARTMENT OF AGRICULTURE AGRICULTURAL MARKETING SERVICE SCIENCE AND TECHNOLOGY PLANT VARIETY PROTECTION OFFICE BELTSVILLE, MD 20705 EXHIBIT C (Soybean)

OBJECTIVE DESCRIPTION OF VARIETY SOYBEAN (Glycine max (L.) Merr.)

NAME OF APPLICANT(S)	FOR OF	FICIAL U	JSE O	NLY			
Pioneer Hi-Bred, International	PVPO N	UMBER					
ADDRESS (Street and No. or R.F.D. No., City, State, and ZIP Code) 7200 62 nd Avenue P.O Box 1004	2	00	2	0 0	0	1	9
Johnston, IA 50131-1004	VARIET 91B42	Y NAME					
		RARY OI ATION :-		ERIMEN	TAL		
PLEASE READ ALL INSTRUCTIONS CAREFULLY: Place the appropriate number that describes the varieties.	ietal chara	cter of	this v	ariety	in the	box	es
Place a zero in the first box (e.g. 9 9 9 or 0 9) when number is either 99 or lo	ess or 9 or	less res	pecti	vely. D	ata fo	r	
plant characters should be based on a minimum of 100 plants. Comparative data should be determined from	varieties e	ntered	in th	e same	trial.	Ro	yal
Horticultural Society or any recognized color standard may be used to determine plant colors; designate syste	em used:						
Please answer all questions for your variety; lack of response may delay progress of your application.							
A. MORPHOLOGY							
Seed Shape:							
$ \begin{array}{ c c c c c c c c c c c c c c c c c c c$							
3 = Elongate $4 = Elongate-Flattened$ (L/T ratio > 1.2; T/W ratio < 1.2) (L/T ratio > 1.2; T/W ratio > 1.2)							
Seed Coat Color:							
1 = Yellow 2 = Green 3 = Brown 4 = Black	_	Other ase Sp		бу) <u></u>			
Seed Coat Luster:							
1 = Dull 2 = Shiny							
Seed Size:							
1 8 grams/100 seeds							
Hilum Color:							
1 = Buff 2 = Yellow 3 = Brown 4 = Gray 6 = Black 7 = Other (Please Specify)	5 = Imp	erfect	Bla	ck			

A. MORPHOLOGY (Continued)

Cotyledon Color:

2 = Green

200200079

Seed Protein Peroxidase Activity:

$$\boxed{2}$$
 $1 = Low$

2 = High

Hypocotyl Color:

1 = Green ('Evans' or 'Davis') Bands below Cotyledons

2 = Green with Bronze

('Woodworth' or 'Tracy')

3 = Light Purple below Cotyledons ('Beeson' or 'Pickett 71')

4 = Dark Purple extending to unifoliolate leaves ('Hodgson', 'Coker', or 'Hampton 266A')

Leaflet Shape:

1 = Lanceolate

2 = Oval

3 = Ovate

4 = Other (*Please Specify*)

Flower Color:

1 = White

2 = Purple

3 = White with a Purple Throat

Pod Color:

1 = Tan

2 = Brown

3 = Black

Pubescence Color:

1 = Gray

2 = Brown (Tawny)

3 = Light Tawny

Plant Habit:

3

1 = Determinate

2 = Semi - Determinate

3 = Indeterminate

13 = X

4 = Intermediate

4 = I

9 = VI

14 = XI

Maturity Group:

1 = 000

6 = III11 = VIII 2 = 007 = IV12 = IX 3 = 08 = V

 $5 = \Pi$ 10 = VII15 = XII

Maturity Subgroup:

Please enter a value from 0 - 9

DISEASE REACTIONS

0 = Not Tested

1 = Susceptible

2 = Resistant

3 = Tolerant

Bacterial

Bacterial Pustule (Xanthomonas campestris pv. glycines (Nakano) Dye)

Bacterial Blight (Pseudomonas syringae pv. glycinea (Coerper) Young, Dye, & Wilkie)

Wildfire Blight (Pseudomonas syringae pv. tabaci (Wolf & Foster) Young, Dye, & Wilkie)

B. , D	ISEASE REAC	TION	S (Continue	ed) 0	= Not Tested	1	= Susceptible	2 = Resistant	3 = Tolerant
Fung	al								A A 7 A
1	Brown Spot	(Septo	ria glycines	Hemmi)				20020	0 0 1 a
	Frogeye Leaf	f Spot	(Cercospora	ı sojina H	Iara)			g in a group and a particular in the	are entre .
0	race 1			0 r	ace 2		0 race 3	3 0 ra	ce 4
0	race 5			0 r	ace 6		0 Other	· (Please Specify) _	
0	Target Spot ((Coryn	iespora cassi	iicola (Be	erk. & Curt.) W	Vei)			
0	Downey Mild	lew (<i>F</i>	Peronospora	trifolioru	m var. manch	urica (Naum.) Syd. ex G	äum)	
0	Powdery Mil	dew (A	Microsphaer	a diffusa	Cke. & Pk.)				
2	Brown Stem	Rot (<i>I</i>	Phialophora ;	gregata (Allington & Cl	hambe	rlain) W. Gams.)		·
0	Stem Canker	(Diap	orthe phased	olorum (C	Cke. & Ell.) Sa	cc. var	. caulivora Athow	& Caldwell)	
1	Pod and Stem	ı Bligl	nt (<i>Diaporth</i> o	e phaseol	lorum (Cke. &	Ell.) S	acc. var. <i>sojae</i> (Le	ehman) Wehm.)	
0	Purple Seed S	Stain (Cercospora i	kikuchii ((T. Matsu. & T	omoya	isu) Gardener)		
1	Rhizoctonia F	Root R	tot (<i>Rhizocto</i>	nia solar	ni Kühn)				
Phytop	ohthora Root Ro	ot (Ph	ytophthora n	negasper	ma Drechs. f. s	p. glyc	inea (Kuan & Erv	win))	
0	race 1	0	race 8	o	race 15	0	race 22		
0	race 2	0	race 9	0	race 16	0	race 23		
0	race 3	0	race 10	0	race 17	0	race 24		
0	race 4	0	race 11	0	race 18	2	race 25		
2	race 5	0	race 12	0	race 19	0	race 26		
0	race 6	0	race 13	0	race 20	0	Other (Please S	Specify)	
2	race 7	0	race 14	0	race 21	L			
1	Bud Blight (To	obacc	o Ringspot V	Virus)					
1	Yellow Mosaid	c (Bea	n Vellow M	osaic Vir	are)				

B. DISEASE REACTIONS (Continued	0 = Not Tested 1 = Susceptible	2 = Resistant	3 = Tolerant
1 Cowpea Mosaic (Cowpea Chlor	otic Virus)	, in an an oppyright to the transfer of the second	garwan gallanda, garwan a
1 Pod Mottle (Bean Pod Mottle V	irus)	20020	079
1 Seed Mottle (Soybean Mosaic V	irus)	the second section of the second section is a second section of the second section of the second section secti	. <u>Markin</u>
Nematode			
Soybean Cyst Nematode (Heterodera gly	cines Ichinohe)		
() race 1 () race 4	O race 9		
0 race 2 0 race 5	3 race 14		
2 race 3 0 race 6	Other (Please Specify)		
0 Lance Nematode (Hoplolaimus o	columbus Sher)		
O Southern Root Knot Nematode (Meloidogyne incognita (Kofoid & White) Cl	nitwood)	
0 Northern Root Knot Nematode	(Meloidogyne hapla Chitwood)		
Peanut Root Knot Nematode (M	eloidogyne arenaria (Neal) Chitwood)		
Reniform Nematode (Rotylenchu	s reniformus Linwood & Olivera)		
Javanese Nematode (Meloidogyn	e javanica (Treub) Chitwood)	•	
Other Nematode (Please Specify)	·············		
C. PHYSIOLOGICAL RESPONSES	0 = Not Tested 1 = Susceptible	2 = Resistant	3 = Tolerant
2 Iron Chlorosis on Calcareous So	ii		
0 Phosphorus	Other (Please Specify)		
0 Boron			
0 Aluminum			
0 Salt			
0 Drought			

D. IN	SECT REACTIONS	0 = Not Tested	1 = Susceptible	2 = Resistant	3 =	Tolera	nt	
0	Mexican Bean Beetle (Epilachna	varivestis Mulsant)		200	20	00	7	9
0	Potato Leaf Hopper (Empoasca fo	abae (Harris))		gamente in personal plants (110 or or		_	,	- 74.
0	Other (Please Specify)	1744.		gannagar to gar san dija An 130 m na	AND THE PROPERTY OF THE PROPER	,		
Е. Н	ERBICIDE REACTIONS	0 = Not Tested	1 = Susceptible	2 = Resistant				
0	Metribuzin							
0	Bentazone							
1	Sulfonylurea							
1	Glyphosate					·		
0	Glufosinate							
0	Pendimethalin							
0	Other (Please Specify)							
F. TF	ANSGENIC COMPOSITION					•	•••	
or, the	e development of the subject variety removal of genetic material from th please complete the following inforn	e application variety?			other t		soyb	
1. Ple	ease state the vector's name:			L		A	j	
2. Ple	ase state the vector components:							
3. Ple	ase describe the genetic material su	ccessfully transferred	into the subject varie	ty:				
4. Ple	ase describe the insertion protocol:							
* Al	iterature citation(s) explaining the f "Transgenic Composition" portion	our information reque of this form.	ests above may be an a	acceptable altern	ative to	comp	letio	n of
G. BIG	OCHEMICAL MARKERS							
Please	lescribe any biochemical informatio	n here which you heli	ava will be belaful in	further describi	na tha e	mbioot	vovi	otaz

Please describe any biochemical information here, which you believe will be helpful in further describing the subject varie (e.g. Simple Sequence Repeats, Restriction Fragment Length Polymorphisms, Isozymic Characterization). Use additional

pages if necessary.

20020007

Exhibit D. Additional Description of the Variety

Soybean Variety 91B42

In Exhibit C we have identified variety 91B42 as susceptible to bacterial blight, brown spot, pod and stem blight, rhizoctonia root rot, bud blight, yellow mosaic, cowpea mosaic, pod mottle and seed mottle.

This does not mean that variety 91B42 is any worse for these problems than other varieties of similar maturity. Rather, we do not consider 91B42 to be immune to these problems. Therefore, we have chosen to be conservative and have identified the line as "susceptible".

Variety 91B42 is a mid Group 1 variety. If Group 1 varieties are divided into tenths, the relative maturity of 91B42 is 1.4.

REPRODUCE LOCALLY. Include form number and edition date on		FORM APPROVED - OMB No. 0581-00
U.S. DEPARTMENT OF AGRICULTURE AGRICULTURAL MARKETING SERVICE	The following statements are made in 1974 (5 U.S.C. 552a) and the Paper	in accordance with the Privacy Act of Reduction Act (PRA) of 1995.
EXHIBIT E STATEMENT OF THE BASIS OF OWNERSHIP	Application is required in order to de certificate is to be issued (7 U.S.C. 2 confidential until the certificate is issued in the certificate in the certificate is issued in the certificate in the certificate is in the certificate in the certificate in the certificate is in the certificate in	2421). The information is held
NAME OF APPLICANT(S)	2. TEMPORARY DESIGNATION	2. VARIETY NAME
Pioneer Hi-Bred International, Inc	OR EXPERIMENTAL NUMBER	91B42
4. ADDRESS (Street and No., or R.F.D. No., City, State, and ZIP, and Country)	5. TELEPHONE (Include area code)	6. FAX (Include area code)
7300 N.W. 62 rd Avenue P.O. Box 1004	515-254-2638	515-253-2478
Johnston, IA 50131-1004	7. PVPO NUMBER	
	000	1 A A A F A
8. Does the applicant own all rights to the variety? Mark an "X" in	the appropriate block.	
If no, please explain.		X YES NO
		A Section of the sect
9. Is the applicant (individual or company) a U.S. National or a U.S	. based company?	
If no, give name of country		X YES NO
10. Is the applicant the original owner?	If no, please answer one of the fo	llowing:
a. If the original rights to variety were owned by individual(s), is	(are) the original owner(s) a U.S. Nation	nal(s)?
YES NO If no, give name of coun	itry	
b. If the original rights to variety were owned by a company(ie:	s) is (are) the original owner(s) a U.S. ha	
	o, is (arc) the original owner(s) a o.o. be	ased company?
YES NO If no, give name of coun		ased company?
YES NO If no, give name of coun	itry	ased company?
	itry	ased company?
Additional explanation on ownership (If needed, use the reverse)	itry	ased company?
	e for extra space):	ased company?
11. Additional explanation on ownership (If needed, use the reverse Plant variety protection can only be afforded to the owners (not lice	ntry e for extra space): nsees) who meet the following criteria: person must be a U.S. national, national	of a UPOV member country, or
Please Note: Plant variety protection can only be afforded to the owners (not lice). If the rights to the variety are owned by the original breeder, that national of a country which affords similar protection to nationals	nsees) who meet the following criteria: person must be a U.S. national, national of the U.S. for the same genus and spec	of a UPOV member country, or sies.
Please Note: Plant variety protection can only be afforded to the owners (not lice. If the rights to the variety are owned by the original breeder, that national of a country which affords similar protection to nationals. If the rights to the variety are owned by the company which emplantionals of a UPOV member country, or owned by nationals of a	nsees) who meet the following criteria: person must be a U.S. national, national of the U.S. for the same genus and spec	of a UPOV member country, or cies. by must be U.S. based, owned by to nationals of the U.S. for the same

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